# **SCORING CRITERIA - WATER**

These are the definitions for each of the five point levels used in the scoring of TSEP applications on statutory priority #1 (Projects that solve urgent and serious public health or safety problems, or that enable local governments to meet state or federal health or safety standards), and CDBG applications on priority #2 (Need for project). The definitions and associated examples are subject to modification during the scoring process. In addition, there are numerous variables involved in scoring projects; as a result, the point level assigned may be higher or lower in order to take into account these variables.

#### **General Scoring Notes**

The score level may be adjusted downward commensurate with the scoring level definitions, depending upon the degree to which:

- 1. the deficiency is existing, long-term or continual;
- 2. the problems related to the deficiency affect the entire or substantial portion of the community, or have a high potential to affect the entire or substantial portion of the community:
- 3. there are reasonable, cost-effective, reliable and long-term management practices that would reduce the health and safety risks and no other reasonable alternatives, temporary or otherwise are available:
- 4. the deficiencies and the impact on the public's health and safety has been documented; and
- 5. the applicant has justified not installing water meters if the system lacks water meters and meters are not included as part of the project.

A court order (or other directive) does not guarantee a particular score. The seriousness of the deficiencies and their impact on the public's health and safety will determine the score awarded.

If there are serious concerns whether the proposed project would solve the public health or safety problems, a level "2" score may be awarded, since the deficiencies identified may not be adequately resolved or other serious problems may potentially be created.

If the most serious deficiencies represent only a small component of the overall project, the project as a whole may be scored lower than what would normally be indicated for the more serious deficiencies. At the Department's discretion, multiple deficiencies may be weighted, based on cost, to determine the scoring level. For instance, if a very small percentage of the project cost goes toward solving a level 5 deficiency and a significantly larger percentage of the project cost is for solving a level 3 deficiency, then the project would probably be scored at a level 3 or 4.

#### **LEVEL 5** (Serious consequences have occurred or are imminent)

**Definition** - Serious consequences (such as illness, disease or injury) clearly attributable to the deficiency in the water facilities described in the application have occurred or are imminent. The applicant has clearly documented the deficiency and impact on the public's health and safety.

**Explanation** - Level 5 scores would only be given if the applicant has clearly documented that an illness, disease or injury has occurred, or is imminent, as a result of the deficiency in the

water facilities. To be rated a "5" the situation must be of an immediate nature. However, some carcinogens in the water supply that persistently exceed primary maximum contaminant level (MCL) standards may in some cases score at a level 5 because the presence of the contaminant is documented, even though health effects may not be imminent or have already occurred.

## **Examples:**

- A community that has documented a total and permanent loss of water source (such as when the groundwater source dries up).
- A community that has documented contamination (or where contamination is imminent) of their water supply with fecal coliform bacteria, giardia, cryptosporidium, acute levels of nitrates, etc. with no current means of protection from the contaminants (such as filtration, disinfection). Even though no illnesses have been connected to the contaminated water system, continued use of the contaminated water is a threat to public health.
- A community that has documented that their groundwater source is under the influence of surface water and contamination of the groundwater supply is occurring or is considered imminent. The community has no current means of protection from the contaminants (such as filtration, disinfection). Continued use of the groundwater source is a threat to public health.
- A community whose water system cannot meet basic wintertime demands (October through March) including (domestic/industrial/commercial) demands, exclusive of irrigation. If a community cannot meet its basic wintertime demands, it is also assumed that fire protection capacity is grossly inadequate.
- A community whose water source has been found to be contaminated by chemical contaminants that exceed unreasonable risk to health (URTH) levels (as defined by Environmental Protection Agency [EPA]) and have a high potential to result in serious illness.
- A community whose water system experiences violations of MCLs for primary standards of contaminants listed in the Safe Drinking Water Act and subsequent amendments. Continued use of the contaminated water or groundwater source has resulted in illness, or illness is imminent. The risk must be documented as a previously unresolved problem that is beyond the direct control of the water supplier.
- A community whose water system has had persistent, acute violations of the Total Coliform Rule, or a community that has an untreated groundwater source with nitrate levels that have resulted in a confirmed MCL violation. Continued use of the contaminated water or groundwater source has resulted in illness, or the risk of illness is imminent. The risk is documented as a regularly reoccurring and unresolved problem that is beyond the direct control of the water supplier.

**LEVEL 4** (Serious consequences are likely to occur in near term)

**Definition** - Serious consequences (such as illness, disease or injury) clearly attributable to the deficiency in the water facilities described in the application are likely to occur in the near term. The applicant has adequately documented the deficiency and potential impact on the public's health and safety.

**Explanation** - Level 4 scores would be given for serious deficiencies where illness, disease or injury has a high probability of occurrence in the near term, but has not been documented to have occurred yet. Level 4 scores would also be reserved for serious water deficiencies when there is a high probability of significantly serious consequences after chronic exposure (exposure over many years).

# **Examples:**

- A community whose water system can meet the basic wintertime domestic demands (exclusive of irrigation), but whose ability to provide fire protection is grossly inadequate in higher density residential, commercial, and industrial areas, affecting key community facilities (such as schools, hospitals, etc.), or in areas that are critical to the local economy.
- A community whose water treatment facility does not adequately treat water, and therefore, illness or disease is highly probable (such as a community who only currently disinfects their surface water and it has been documented that additional treatment such as filtration is required).
- A community whose groundwater source is documented to be under the influence of surface water and adequate treatment facilities are not currently available.
- A community does not have a backup water supply or redundancies in the water system (such as backup intake pump for surface water treatment plant) and a failure of the existing facilities (such as pump or source) would likely result in the total loss of supply.
- A community that has documented a significantly reduced yield from its water source such that it cannot meet system demands exclusive of irrigation (such as groundwater source drying up).
- A community whose water system experiences reoccurring exceedances of MCLs for primary standards of contaminants listed in the Safe Drinking Water Act and subsequent amendments, but has not had a confirmed MCL violation based on quarterly sampling. Continued use of the contaminated water or groundwater source has a high probability of resulting in illness in the near term. The problem must be documented as a previously unresolved problem that is beyond the direct control of the water supplier.
- A community whose water system has had persistent, non-acute violations of the Total Coliform Rule. Continued use of the contaminated water or groundwater source has a high probability of resulting in illness in the near term. The problem must be documented as a previously unresolved problem that is beyond the direct control of the water supplier.
- A community whose water system has a groundwater source with consistently elevated nitrate levels above one-half the MCL. Continued use of the contaminated groundwater source has a high probability of resulting in illness in the near term.

- A community whose deteriorated water mains are located in an area with heavily contaminated soils with a high potential for contaminants to enter the water supply in the near term.
- A community that has significant safety issues in the treatment plant or at a pumping station, which have a high probability of causing serious injury to the operator in the near term.

# **LEVEL 3** (Serious consequences are likely to occur in long term)

**Definition** - Serious consequences (such as illness, disease or injury) attributable to the deficiency in the water facilities described in the application are likely to occur in the long-term if the deficiency is not corrected. The applicant has adequately documented the deficiency and potential impact on the public's health and safety.

**Explanation** - Level 3 scores would be given for serious water deficiencies where illness, disease or injury has a high probability of occurrence after chronic exposure, but where the consequences are not as serious as those associated with a Level 4. Level 3 scores would also be reserved for deficiencies where illness, disease or injury has some reasonable probability of occurrence in the near term as a result of incidental, short-term or casual contact, but has not been documented to have occurred yet. Communities attempting to proactively comply with laws and regulations dealing with health and safety may also be scored Level 3, or higher.

# **Examples:**

- A community whose water system can meet the basic wintertime domestic demands (exclusive of irrigation), and can provide some fire protection, but the water system's capacity to provide fire protection is below standards in high density developments, affecting key community facilities (such as schools, hospitals, etc.), or in areas that are critical to the local economy.
- A community whose water system is grossly inadequate in terms of providing fire protection in areas of lower density housing and commercial areas, and areas not critical to the local economy.
- A community that is making proactive improvements to the infrastructure of a public water system that helps it remain in compliance with current regulatory requirements, ensures compliance with future requirements, or prevents future violations of any applicable state or federal law or regulation. A higher score for proactive improvements could be realized if the improvements address imminent or near term health and safety issues.
- A community whose water system has had occasional, but reoccurring, non-acute violations of the Total Coliform Rule. Continued use of the contaminated water or groundwater source has a high probability of resulting in illness in the long term. The problem must be documented as a previously unresolved problem that is beyond the direct control of the water supplier.
- A community whose water system frequently detects organic chemicals, but has not yet exceeded MCLs for primary standards of contaminants listed in the Safe Drinking Water Act

and subsequent amendments. Continued use of the contaminated water or groundwater source has a high probability of resulting in illness in the long term.

- A community whose water system has a groundwater source with elevated nitrate levels above one-half the MCL. Continued use of the contaminated groundwater source has a high probability of resulting in illness in the long term.
- A community with low distribution system pressures, frequent leaks and a reasonable potential for backflow contamination in the long term.
- □ A community that is proposing improvements, such as replacing leaky water mains to reduce losses, resulting in significant improvement in pressure, water quality, or fire protection.
- A community with components, such as a pumping station, that have outlived their useful life and could potentially fail in the long term.
- A community that has a safety issue in the treatment plant or at a pumping station that has a reasonable probability of causing serious injury to the operator in the long term.
- An untreated groundwater source with extremely high levels of secondary contaminants such as manganese, iron, or sulfates. The levels must be several times greater than the secondary MCLs.

## **LEVEL 2** (Serious consequences may occur at some point in the future)

**Definition** - The deficiency described in the application could potentially affect the public's health and safety and circumstances clearly attributable to the deficiency may occur at some point in the future but have not been documented to have occurred yet.

**Explanation** - Level 2 scores would be given for those applications that have a deficiency, perhaps in meeting current design standards, but are unable to show that a serious threat to public health and safety is likely to occur.

#### **Example:**

- A community that has the ability to provide basic domestic demands and has the ability to provide adequate fire protection in high density developments, affecting key community facilities (such as schools, hospitals, etc.), or in areas that are critical to the local economy, but still experiences water shortages, most likely due to summertime irrigation demands.
- A community that can provide some fire protection, but the water system's ability to provide fire protection is below standards in areas of low-density development, and parks.
- □ A community that has poor water quality aesthetics such as color or odor.
- A community that has low chlorine residuals as a result of long dead end mains.

 A community whose water system has contaminants (such as iron, manganese, sulfate, total dissolved solids) that exceed secondary standards as listed in the Safe Drinking Water Act and subsequent amendments.

#### LEVEL 1

**Definition** - A deficiency in a basic water facility or community service that could affect the public's health and safety was not demonstrated or was inadequately documented.

**Explanation** - Level 1 scores would be given for those applications that may claim a deficiency, but in the opinion of the MDOC review team are unable to document a serious or credible threat to public health and safety. The claimed deficiency may be related to routine operations and maintenance issues. Level 1 scores are rare; nearly all projects should be able to achieve a level 2 score.

# **Examples:**

- A community that is making improvements to the water system to improve efficiency and/or reduce operation and maintenance costs.
- Replacement of routine equipment or performance of routine maintenance, such as hatch replacement or water reservoir painting, that should reasonably be a part of a normal maintenance program.